**package** searchsort;

**import** java.util.Scanner;

**import** javax.swing.JOptionPane;

**public** **class** Linear\_search {

**public** **static** String[] mymethod(String arr[], String x)

/\*\*

\* setting up a method mymethod containing linear search adopting for loop

\* input :

\* String arr[] : array that the list will search

\* String x : item being searched in the array

\* output :

\* return newarr[] : outputs the array containing the value being searched and the index at indexes 0 and 1 each

\* return newarr[] : if the element is not found, the newarr[1] would be -1, which is an impossible index, to indicate that the item is not found

\*\*/

{

**int** n = arr.length;

String[] newarr = {"",""};

**for** (**int** i = 0; i < n; i++)

{

**if** (arr[i].equals(x)) {

newarr[0]=arr[i];

String si = Integer.*toString*(i);

newarr[1]=si;

**return** newarr;

}

}

newarr[1]="-1";

**return** newarr;

}

**public** **static** **void** main (String[] args) {

String slen = JOptionPane.*showInputDialog*("Input Length of the array");

**int** len = Integer.*parseInt*(slen);

String[] arr= **new** String[len];

**for** (**int** d=0;d<len;d++) {

String sel = JOptionPane.*showInputDialog*("Input element of the array");

arr[d]=sel;

}

String ssearch = JOptionPane.*showInputDialog*("Please input item you wish to search");

String[] result = *mymethod*(arr, ssearch);

**if** (result[1] == "-1") {

JOptionPane.*showMessageDialog*(**null**, "Element is not present in array");

}

**else** {

String full = "";

**for** (**int** i=0;i<len;i++) {

full = full + arr[i]+", ";

}

JOptionPane.*showMessageDialog*(**null**, "In array " + full + ", Element "+ result[0] + " is present at index "+ result[1]);

}

}

}















